CITY OF BEAVERTON Traffic Signal Maintenance Lead

General Summary

Serve as crew lead responsible for managing small or routine projects. Plan, assign and review crew work. Perform a full range of construction, maintenance, and repair duties related to the traffic signal and street lighting systems including the operation of equipment. Perform administrative duties to assist with efficient and effective flow of work within section. May act as Supervisor in his or her absence.

Key Distinguishing Duty

Coordinate small or routine projects and serve as Lead Worker to the section including the following: daily planning and work assignments of crews; conducting the performance discussions developing the performance appraisals for assigned employees.

Essential Functions

Depending upon assignment, the incumbent may perform a combination of some or all of the following duties, which are a representative sample of the level of work appropriate to this class.

- 1. Assign, schedule and review staff work. Provide coaching to employees and develop performance evaluations. Participate in the selection process.
- 2. Act as primary person in coordinating projects. Develop work plans, timelines and resource allocations for assigned projects. Monitor progress to ensure objectives are met and sound environmental practices are followed.
- 3. Serve as a member of the traffic maintenance section leadership team. Evaluate performance and program effectiveness and recommend action for improvement as necessary. Prepare reports. Assist in the preparation and monitoring of the section budget.
- 4. Prepare estimates for traffic device installations. Test and inspect new equipment. Check for compliance with State code.
- 5. Perform surveys in field to check streetlights, signals and City traffic control signs to determine maintenance needs.
- 6. Respond to emergency signal malfunctions and restore to proper working order. Respond to citizen complaints or inquiries relative to traffic signals, street lights or code violations.
- 7. Develop work plans, timelines and resource allocations for assigned projects. Monitor progress to ensure objectives are met.
- 8. Coordinate work activities with staff, internal and external customers, contractors, vendors and the general public. Develop contract specifications for bid requests.

- Participate in construction bid process and serve as contract administrator. Provide project overview for conformance to contract specifications. Authorize payments to contractors and consultants.
- 10. Assist in the review of new construction plans pertaining to traffic systems. Inspect new construction, installation and capital projects. Develop and write walk-through inspection reports for new construction.
- 11. Perform work of crew members including but not limited to the following: operate tools and equipment used to maintain, repair and replace traffic signals and street lighting including jackhammer, power hoist, concrete saw, welding torch and bucket truck.
- 12. Identify equipment needs. Ensure equipment is properly maintained.
- 13. Review record keeping and documentation to ensure compliance with local, state and federal agencies, laws, codes, ordinances and regulations.
- 14. Assist in ordering needed materials. Complete paperwork and records. Follow up on incorrect or non-received purchases.
- 15. Exhibit leadership to staff, work teams and fellow employees. Serve as a model for accomplishing City's vision and goals. Create an environment in which employees are focused on producing excellent quality results.
- 16. Produce an acceptable quantity and quality of work that is completed within established timelines.
- 17. Model and coach employees on excellence in internal and external customer service. Promote professional and courteous behavior with a creative approach to problem resolution that creates a positive experience for the customer.
- 18. Represent the traffic maintenance section and/or City to the public, in legal or administrative proceedings, to other organizations or entities and in other situations as required. Make presentations and provide comment and testimony. Advance and protect the interests of the City and its citizens in all matters.
- 19. Provide employees with basic job training and safety instruction. Actively support safety and loss control measures. Ensure employees are held to departmental safety and loss control standards.
- 20. Develop safe work habits and follow all required safety policies, procedures and techniques. Contribute to safety of self, co-workers and the general public.
- 21. Participate in the City Emergency Management program including classes, training sessions and emergency events.
- 22. Follow standards as outlined in the Employee Handbook.
- 23. Actively promote and support diversity in the workplace through staffing, promotions, training and career development. Model respect for diversity in the workplace.

Other Functions

1. Perform related duties of a similar scope and nature.

Knowledge Required

- Advanced knowledge of safety practices and principles related to traffic signals and lighting systems.
- Advanced knowledge of flagging.
- Expert knowledge of electrical and electronic theory as it pertains to traffic signals and street lighting systems including computerized traffic control devices, equipment specifications and wiring diagrams.
- Expert knowledge of the practices and principles of traffic signal and street lighting maintenance, repair and replacement.
- Basic understanding of traffic engineering theory and principles.
- Working knowledge of the federal, state, and local standards, codes, ordinances, laws and regulations governing civil engineering, public works engineering, construction and inspection projects.
- Working knowledge of practices and principles of civil engineering.
- Working knowledge of engineering design practices.
- Working knowledge of computer aided design and drafting programs.
- Working knowledge of issues and trends in the construction industry.
- Basic knowledge of project budgeting.
- Basic knowledge of project management techniques.
- Basic knowledge of managing consultant and construction contracts.
- ♦ Advanced knowledge of the laws and regulations governing traffic signal and street lighting maintenance, repair and replacement including the Uniform Traffic Control Devices Manual.
- Working knowledge of public purchasing and contracting laws and regulations.
- Basic knowledge of practices and principles of public/business administration and decisionmaking.
- Basic knowledge of human resources management practices.
- Basic understanding of strategic planning methods with an emphasis on services related to traffic signals and lighting systems.
- Working knowledge of basic arithmetic and mathematics principles.
- Working knowledge of English grammar, spelling and usage.

Skills/Abilities Required

- Expert ability to perform skilled journeyman level work in the electrical trades including skilled electronic maintenance and repair of equipment.
- Expert ability to operate equipment used in traffic signal and street lighting maintenance, repair and replacement.
- Expert ability to read and follow electrical plans and specifications.
- Expert ability to diagnose causes of electrical failure.
- Strong ability to use tools and small equipment related to traffic signals and street lighting systems.
- Expert ability to read technical manuals.
- Ability to read maps.
- Advanced ability to maintain accurate records.
- Advanced ability to perform engineering computations.
- Advanced ability to apply and interpret codes and ordinances.

- Advanced ability to read engineering plans and specifications.
- Ability to manage consultant and construction contracts.
- Strong ability to productively participate on a team and in a team environment including the ability to develop a team approach to producing high quality results
- ♦ Skill in conceptual analysis and policy/program development and implementation.
- Ability to develop budget input and resource estimates.
- Strong ability to productively lead and/or participate on a team and in a team environment including the ability to develop a team approach to producing high quality results.
- Strong ability to effectively lead a staff including training, coaching, scheduling and reviewing work.
- ♦ Strong ability to demonstrate leadership behavior to employees, contractors, public officials, other agencies, customers and the general public.
- Strong ability to establish and maintain effective working relationships with employees, contractors, other agencies, public officials and the general public.
- Strong ability to apply and to coach employees on excellent internal and external customer service skills.
- Strong ability to communicate effectively both orally and in writing with diverse customers, employees, contractors, other agencies, public officials and the general public. Ability to make presentations and develop reports that may include technical information.
- Advanced ability to use word processing, spreadsheet programs or other application software as required for position.
- Ability to use general office equipment.

Minimum Qualifications Required for Entry

High School diploma or GED and 5 years experience in traffic signal and lighting systems maintenance, repair and replacement with 1 year of operating equipment used in this field including component, controller and bench work and some experience in a lead role or an equivalent combination of education and experience enabling the incumbent to perform the essential functions of the position.

Licensing/Special Requirements

- Positions in this classification are required to possess a valid driver's license and the ability to meet the City's driving standards.
- ◆ Commercial Driver's License B with air brake endorsement required.
- Traffic flagger training required within three months of employment.
- Limited Maintenance Electrician license required with higher level certification preferred.

Working Conditions

Daily precise control of fingers and hand movements; daily standing for prolonged periods; weekly lifting, moving and carrying of objects over 50 pounds; occasional lifting up to 90 pounds; crouching, crawling, bending, kneeling, climbing or balancing and working at high elevations; frequent work in all weather conditions and around traffic; occasional response to emergency conditions off-hours; regular exposure to vibration, fumes and high noise levels; exposure to electrical current; occasional dealing with distraught or difficult individuals; occasional attendance at meetings or activities outside of normal working hours; daily operation of a motor vehicle on public roads.

Classification History

As of 10/97: Traffic Signal Electrician

Revised: 1/98

New class specification title 1/98: Traffic Signal Electrician Revised: 9/2000 Traffic Signal Maintenance Lead

Revised: 11/2004 Revised: 1/1/09

Status: SEIU

FLSA: Non-exempt

Department Head Signature	Human Resources Signature
Date	Date